

Citation 3

## PATENT ABSTRACTS OF JAPAN

(11)Publication number : 04-299399

(43)Date of publication of application : 22.10.1992

(51)Int.Cl.

G10L 3/02

G10L 7/08

(21)Application number : 03-089601

(71)Applicant : RICOH CO LTD

(22)Date of filing : 28.03.1991

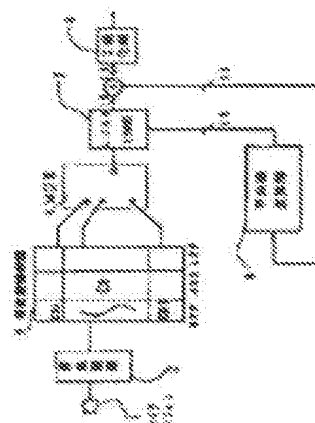
(72)Inventor : YASUDA HARUTAKE

## (54) VOICE FEATURE QUANTITY EXTRACTION DEVICE

(57)Abstract:

PURPOSE: To provide the feature quantity extraction device which can normalize sound source characteristics through simple arithmetic when features are extracted by a BTSP system.

CONSTITUTION: The voice signal inputted from a microphone 1 is amplified and corrected by a preprocessing part 2. A frequency analysis part 3 obtains power spectra(TSP), channel by channel, and they are put into a time series by a multiplexer(MUX) and stored in a register 5 for 15 channels. The power spectra stored in the register 5 are supplied to a mean value arithmetic part 6 and mean values of three adjacent channels of the power spectra are found. An adder 7 subtracts the mean value of each channel, found by the mean value arithmetic part 6, from the original power value to obtain the normalized sound characteristics of the speaker, thereby obtaining nearly the same effect with the least square approximate straight line.



City of Austin

(43)Date of publication of application : 02.11.2000

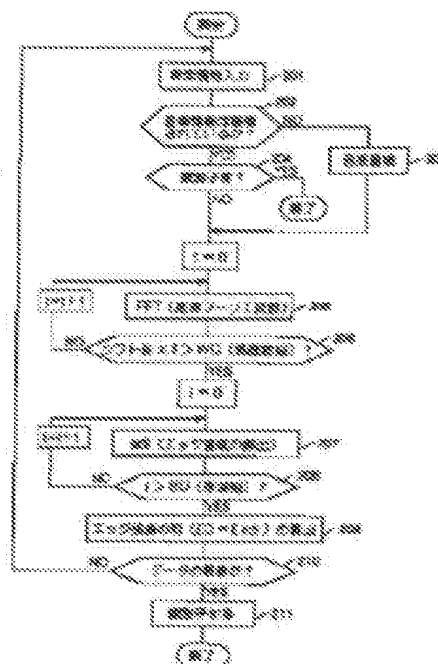
G10L 11/00  
G06F 12/00  
G06F 17/30  
G10L 15/02  
G10L 21/06

(71)Applicant : NIPPON TELEGR & TELEPH CORP  
<NTT>

(72)inventor : MINAMI KENICHI  
MATSUURA YUMIKO  
TOMIOKA ATSUKI  
KOJIMA HARUHIKO

(57)Abstract:

**SOLUTION:** A spectrogram is calculated by analyzing frequency of input music information 205. Edge intensity (edi) of the spectrogram in the time axis direction is calculated 207. The edge intensity (edi) is summed in the frequency axis direction to calculate an edge intensity sum ED 209. Data indicating the ED or an increase, a decrease or a continuation of the ED are added to a header of the music information as an identifier to store in a database.



Citation B

## PATENT ABSTRACTS OF JAPAN

(11)Publication number : 11-261961

(43)Date of publication of application : 24.09.1999

(51)Int.Cl.

H04N 5/92  
 G06T 1/00  
 G06T 15/70  
 H04N 5/765  
 H04N 7/24  
 H04N 7/18

(21)Application number : 10-058084

(71)Applicant : TOSHIBA CORP

(22)Date of filing : 10.03.1998

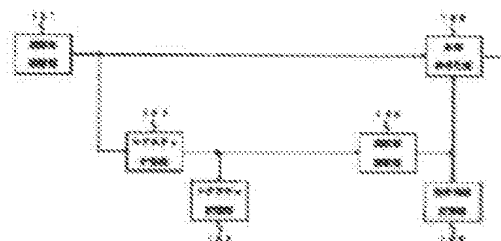
(72)Inventor : NAKASHIKA MASAHIRO

## (54) MOVING IMAGE PROCESSOR

## (57)Abstract:

**PROBLEM TO BE SOLVED:** To allow the processor to conduct processing of a moving image such as analysis, retrieval, collation without referring to an original image or an image of the same size as that of the original image.

**SOLUTION:** A signature calculation section 102 calculates a signature of a digital moving image in the unit of one field or frame based on prescribed rules. A moving image analysis section 104 uses this signature to conduct moving image analysis processing such as detection of 3:2 pull-down pattern, detection of a still image part, and retrieval and collation of a moving image without referring to the original image. Thus, processing such as analysis, retrieval, and collation of a moving image is conducted by using a storage section with a small capacity, a low speed transmission section and a low speed processing section.



Citation C

## PATENT ABSTRACTS OF JAPAN

(11)Publication number : 2000-285237

(43)Date of publication of application : 13.10.2000

(51)Int.Cl.

G06T 7/00

G06F 17/30

(21)Application number : 11-092050

(71)Applicant : MINOLTA CO LTD

(22)Date of filing : 31.03.1999

(72)Inventor : MURAKAWA AKIRA  
HASHIMOTO KEISUKE

## (54) METHOD AND DEVICE FOR PICTURE PROCESSING AND RECORDING MEDIUM WITH PICTURE PROCESSING PROGRAM RECORDED

## (57)Abstract:

PROBLEM TO BE SOLVED: To increase the speed of the processing which retrieves a specific pattern from a picture in the picture recognition processing.

SOLUTION: At the time of retrieving a specific pattern from a picture 20, a picture processor generates a map picture 22, whose pixels correspond to block area of the picture 20 in 1:1, and it labels individual pixels of this map picture 22 on the basis of feature quantities of block areas of the picture 20. Thereafter, the picture processor detects a prescribed pattern for specification of an area on the map 22 and specifies the block area on the original picture 20, which corresponds to the position on the map picture 22 where this prescribed pattern is detected, as area where the specific pattern exists.

Retrieval processing of the specific pattern is performed in this area.

